(a) the approximate number of people in Orissa who earn their livelihood by plucking tendu leaf and making beedis;

(b) whether Government are aware of the problems of those Beedi workers;

(c) if so, the details thereof; and

(d) the steps taken for the welfare of those workers?

THE MINISTER OF STATE OF THE MINISTRY OF LABOUR (SHRI M. P. VERENDRA KUMAR): (a) to (d) The information is being collected and will be laid on the Table of the House.

National Policy for Ocean Development

254. SHRI PARAG CHALIHA: Will the PRIME MINISTER be pleased to state:

(a) whether there is any national policy for ocean development in existence;

(b) if so, the details and salient features thereof; and

(c) if not, whether Government are considering formulation thereof?

THE MINISTER OF STATE OF THE MINISTRY OF SCIENCE AND TECHNOLOGY AND THE MINISTER OF STATE OF THE MINISTRY OF POWER (SHRI YOGENDER K. ALAGH): (a) Yes, Sir. The Government enunciated an Ocean Policy Statement in 1981 in order to address the national priorities in the field of ocean science & technology.

(b) A statement is annexed (*See below*).

(c) Question does not arise.

Statement

The oceans are known to be our last frontiers. Our long coast and the sense of adventure of our ancients fostered a great maritime tradition. The Indian Ocean which washes our shores provides opportunities which need to be utilised. For success in ocean development, the entire nation should be permeated by the spirit of enterprise and the desire to explore the frontiers of knowledge. Our experience in other fields of scientific endeavour will help our efforts in ocean development. What is necessary is a policy and structure to facilitate a dynamic thrust, keeping in view developments in other parts of the world.

The adoption, by an overwhelming majority of nations of the Convention of the UN Conference on the Law of the Sea has established a new international order for the oceans. This extends the economic jurisdiction of coastal states to an area ranging from 200 to 350 miles from the coastline. According to his regime, nearly 2 million square kilometres of area, or very nearly two-thirds of the landmass has come under India's national jurisdiction. In this area, the exclusive right to utilise living and non-living resources vests with the nation. Besides, India has been recognised as a "Pioneer Investor" in ocean mining. This gives India the exclusive right to operate in an area of upto 150,000 square kilometres in the high seas for the recovery and processing of polymetallic nodules.

For ages, the sea has enabled our people to sail to near and distant lands and has been a source of livelihood to large numbers of people. Even now Indian public and private enterprises do use ocean resources. The country is producing significant quantities of fish and hydrocarbons from the sea and much scientific work has been done in collecting basic knowledge and information about the sea and seabed and in surveying, charting and exploiting it. Progress has also been made in construction and development of offshore structures.

The vastness, complexity and uncertainty of the ocean environment calls for a co-ordinated, centralised and highly sophisticated development response. This should be based on adequate knowledge of marine space (sea-bed, water and air columns included) as a fundamental prerequisite to the control, managment and utilisation of the rich and varied natural

resources available in the sea. In addition to basic knowledge to determine the potentialities inherent in the Indian sea-space, we have to develop appropriate technologies to harness these resources.

A supporting infrastructure has to be built. Effective systems of management and control of the entire set up are also necessary.

We need to map living resources, prepare an inventory of commercially exploitable fauna and to map and assess the availability of minerals from the deep sea. The supporting infrastructure and incentives required are research vessels of different types, manpower, well-laid out programmes of resource exploitation, advanced technology and everything necessary to promote the growth of ocean technology. In the management sector, the high seas and the Exclusive Economic Zone (EEZ) upto 320 kilometres have to be looked into for the exploitation of the wealth occuring therein.

The main thrust should be on the optimal utilisation of living resources like fish and seaweeds, exploitation of non-living resources such as hydrocarbons and heavy placer deposits, harnessing of renewable resources of ocean energy from waves, temperature differences in the water column, tidal heights and salinity gradients and the collection and processing of polymetallic nodules from the deep sea.

Marine development is linked with scientific and technological achievements in other areas. Hence while we develop basic marine science and technology, i.e. technology for marine environment, our technological advances have to be greared to the utilisation and preservation of the marine environment. The extension of national frontiers by an area of 2 million square kilometres of ocean space and the consequent access to new sources of energy, minerals and food, requires great strides in ocean engineering, specially in tasks related to structures, materials, instrumentation, submersibles and systems of propulsion of ships. The exploitation of natural food resources such as fish and seaweeds, and the generation of additional food resources by cultivation, also need scientific methods of aquaculture and mariculture. To survey and predict the ocean environment, the main tasks necessary are seafloor mapping, charting, geodesy, ocean dynamics, currents, waves, cyclones, marine fauna, chemistry and physics of the oceans and seabed mineral mapping, delineation and assessment. Research in all these areas must examine the various processes and their origins so as to have a fundamental understanding, ensuring predictive capabilities. Marine science and technology has also to look beyond the current state-of-the-art to achieve major technological break-through in the future.

Besides research and development in basic sciences, we should survey the deeper parts of the ocean. Similarly in the deep sea, detailed survey and sampling in the regions of EEZ and the adjacent ocean will be necessary to locate and evaluate the rich and economically viable deposits of polymetallic nodules, heavy metals, fossil placers and phosphorite deposits. The gathering of data from surveys should be co-ordinated and a cost-effective system of integrated surveys established.

Much more needs to be done for the development of indigenous technology for the exploitation of fish from deeper waters. This also means setting up of infrastructure facilities and services to operate large-sized fishing vessels.

An important component of the development programme should be the acquisition of technology. To be self-reliant, such technologies would have to be largely developed, tested and operated indigenously. Technologies relating to instrumentation, diving systems, position fixing and position maintenance, materials development, oceanic data collecting devices, anti-erosion capabilities, submersibles, energy and energy-saving devices are priority items. Several new tech-

nologies will have to be commercialised and made cost-effective.

Infrastructural support forms an essential prerequisite for ocean development. The variegated infrastructure already available in the country will have to be appropriately augmented, and more particularly in basic supporting facilities like safety and rescue at sea, navigational chains, communications net-works, development of appropriate maps and charts, etc. Infrastructural support for providing a complete and relaible information system through a net-work of data centres on marine resources, processing and marketing systems, advanced technologies and financial assistance would also be necessary. This requires a broadening and strengthening of available infrastructural facilities. Provisions of adequate ports and harbours, ship-building and ship-repair facilities will be needed in addition to adequate skilled manpower in various sectors of development.

Surveillance and conservation of the marine environment and its resources call for an integrated legal framework and its concomitant enforcement. Several laws have already been promulgated regarding the maritime zone, fisheries, etc. The Coast Guard Organisation looks after the enforcement aspects of several of these legislative measures. The co-ordinating mechanisms of the overall structure of legislation will have to be suitably strengthened under the aegis of the Department of Ocean Development.

In the light of this, we must have a data base to co-ordinate efforts made by different agencies. This is all the more necessary because of the rapid growth of information in ocean science and technology. A centralised data system will be set up by the Department of Ocean Development with a proper mechanism for collection, collation and dissemination of information acquired both indegenously and from foreign sources.

The creation of a self-reliant technological base puts a heavy demand on fully trained personnel. The training of skilled manpower is to be adequately planned. Young scientists, technologists and engineers will be encouraged to participate in the programme of ocean development and steps will be taken to induce Indian scientists from within the country and abroad to participate in it.

Existing agencies will have to be appropriately strengthened to meet the demands of this growing challenge. The Department of Ocean Development will function in conjunction with other concerned agencies as a focal point to promote institutional capability in areas where significant work is lacking. The complex programme that ocean development entails will require well-designed management and institutional extension of the Department of Ocean Development with sufficient powers vis-a-vis other agencies to help proper and speedy ocean development, which enables India to be in the forefront of the international effort. This would also mean close co-operation with both developing and developed countries in a spirit of understanding of the concept that the oceans are a common heritage of humankind.

Measures to check Corruption

255. SHRI BANGARU LAXMAN: Will the PRIME MINISTER be pleased to state the measures taken or proposed to be taken by Government to check corruption in the country?

THE MINISTER OF STATE IN THE MINISTRY OF PERSONNEL, PUBLIC GRIEVANCES AND PENSIONS AND THE MINISTER OF STATE IN THE MINISTRY OF PARLIAMENTARY AFFAIRS (SHRI S.R. BALASUBRAMONIYAN): The Government is fully alive to the need to eradicate corruption at all levels and is committed to ensure a clean administration. The drive against corruption in public services is a continuing process. Policies, in this regard, have been formulated and are being continously modified from time to time in order to make them more effective and